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CLAIMS

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- 1. A catalyst for dimethyl carbonate synthesis, which is used for producing dimethyl carbonate from acetone dimethyl acetal and CO_2 in a supercritical state, wherein the catalyst is obtained by loading a strong acid on a carrier composed of a compound having a solid state.
- 2. The catalyst for dimethyl carbonate synthesis according to claim 1, wherein the strong acid contains one or more compounds selected from SO_4^{2-} or PO_4^{3-} .
- 3. The catalyst for dimethyl carbonate synthesis according to claim 1, wherein the compound having a solid acid site is one or more selected from ZrO_2 , Al_2O_3 , and TiO_2 .
- 4. The catalyst for dimethyl carbonate synthesis according to claim 2, wherein the compound having a solid acid site is one or more selected from ZrO_2 , Al_2O_3 , and TiO_2 .
- 5. The catalyst for dimethyl carbonate synthesis
 20 according to claim 3, wherein the specific surface area of
 the carrier composed of one or more selected from ZrO₂,
 Al₂O₃, and TiO₂ is 40 to 200 m²/g.
 - 6. The catalyst for dimethyl carbonate synthesis according to claim 4, wherein the specific surface area of the carrier composed of one or more selected from ZrO₂,

 Al_2O_3 , and TiO_2 is 40 to 200 m^2/g .